(b) The main features of the agreement are as follows :—

(i) Phase I comprises 695 MW of a two phase combined cycle power station. Phase II will comprise 1320 MW.

(ii) Phase I will be fuelled by No. 2 distillate fuel oil. After Phase II, both Phase I and II will be fuelled by LNG.

(iii) Capital cost of Phase I is US dollars 910 Million which includes a port and fuel facility, the costs of associated infrastructure being constructed by Govt. of Maharashtra and MSEB such as Roads, Water etc. and Interest during construction.

(iv) Construction of Phase I is estimated to start after financial closure which is targetted for July/August, 1994 and the plant is estimated to come on stream 33 months later in March, 1997. Bechtel will be the main civil contractors and GE(USA) the main equipment supplier.

(v) Planned debt equity ratio for Phase I is 70 : 30.

(vi) As per PPA, which provides sufficient flexibility regarding the initiation of Phase-II. Phase-II is decoupled from Phase-I without any legal binding on either party.

(c) Enron had proposed a tariff structure different from the two part tariff provided for in the notification. The tariff structure has been negotiated, finalised and found acceptable by the two parties i.e. Enron and MSEB.

(d) and (e) The capital cost and consequently the capacity charges are fixed subject to increase according to agreed escalations. Fuel cost being the actual landed cost is a pass through in the tariff. The capital cost of the Phase I (695 MW) is Rs. 2912 crores.

Pollution causing Thermal Power Plants

4533. SHRI KRISHNA KUMAR BIRLA : Will the Minister of POWER be pleased to state :

(a) whether any exercise has been made to identify the pollution causing Thermal Power Stations in the country ;

(b) if so, what are the details thereof;

(c) what measures have been taken to control the pollution level so far and what are the reasons for failure to check environmental pollution caused by these Thermal Power Plants ; and

(d) what steps are contemplated by Government in this regard ?

THE MINISTER OF STATE IN THE MINISTRY OF POWER (SHRI P. V. RANGAYYA NAIDU) : (a) Yes, Sir. The Ministry of Environment & Forests have identified 41 Thermal Power Stations in this country which are not complying with the pollution control standards.

(b) and (c) Pollution Control works have been included in the renovation and modernisation programme under the Seventh and Eighth Plan period and the progress on these works is regularly monitored by the Central Electricity Authority. The progress on these works is slow because of funds constraints of Electricity Boards as they are capital intensive with long gestation period requiring long shut down of Stations.

(d) Steps taken to check the pollution from thermal plants include :

(i) (a) All new coal fired thermal power plants are provided with high efficiency electrostatic precipitators to arrest the emission of particulate matter ;

(b) tall stacks are also provided for dispersal of the sulphur oxide gases to limit the ambient air quality within the prescribed limits.

(ii) The older ESPs and cyclone separators are being replaced/ modified in older coal fired plants.

(iii) The ash generated in the thermal power plants is generally dumped in the low lying areas much away from the power plants and from the inhabited areas and mounds are being created and plants are grown over them to give a green look to the area and to save the ambient air from flying ash/dust nuisance.

(iv) Effluent chemicals are treated in the treatment plants before these are discharged out of the power plant areas.

(v) In case of gas fired gas turbine power plants, methods like streak injection etc. are applied to keep the NOX levels within limits.

(vi) Nitrous gases (NOX) emissions are controlled by providing modern design of coal burners. New technologies like Fluidised Bed Combustion are also being tried for application on smaller plants.

Pending Proposals for Gas-Based Power Projects in Madhya Pradesh

4534. SHRI SUSHILKUMAR SAMBHAJIRAO SHINDE : Will the Minister of POWER be pleased to state :

(a) whether a number of gas-based power projects, intended to be fed from HBJ pipeline, submitted by Madhya Pradesh Government have been pending with Government ;

(b) if so, what are details thereof and what is their present status ; and

(c) whether the projects have been cleared from various technical angles, including the environmental aspect, if so, the details in this regard, and if not, the reasons for the delay ?

THE MINISTER OF STATE IN THE MINISTRY OF POWER (SHRI P. V. RANGAYYA NAIDU) : (a) to (c) In view of the constraints in the availability of gas, no gas-based power plant is being considered to be set-up in the State of Madhya Pradesh.

The requisite details of gas-based power projects intended to be fed from the HBJ pipeline submitted by the Madhya Pradesh Electricity Board which have since been returned to them are given in the Statement.

Statement

Sl. No.	Name of the Project and capacity	Estimated Cost (Rs. Crores)	Date of return	Status
1	2	3	4	5
1.	Vijaypur Combined Cycle Gas Turbine Project (2×30 MW GT + 1×30 MW ST)	11,700	10/91	Clearance not tied include; associated transmission system clearance of environmental agencies (centre).
2.	Gwalior Combined Cycl/Gas Turbine Project (817 MW)	838	9/92	Clearances/inputs not tied up include; gas linkage, associated transmission system etc.

विद्युत संचालित जल-पम्पों के लिए बिजली के कनेक्शन

4535. **श्री मूलचन्द मीणा** : क्या विद्युत मंत्री यह बताने की कृपा करेंगे कि :

(क) क्या यह सच है कि सिंचाई के प्रयोजनार्थ जल-पम्पों के लिए बिजली के कनेक्शन प्राप्त करने हेतु किसानों की प्रतीक्षा-सूची में प्रति वर्ष वृद्धि हो रही है;

(ख) यदि हाँ, तो पिछले तीन वर्षों के दौरान प्रत्येक सूची का राज्य-वार ब्यौरा क्या है; और

(ग) सरकार द्वारा और विलम्ब किए बिना सिंचाई पम्पों के लिए बिजली के कनेक्शन देने हेतु क्या कार्यवाही की गई है अथवा किए जाने का विचार है ?

विद्युत मंत्रालय में राज्य मंत्री (श्री पी०वी० रंगैय्या नायडू) : (क) उपलब्ध सूचनानुसार, जिन किसानों ने बिजली कनेक्शन के लिए आवेदन किया है, अधिकतर राज्यों में उनकी प्रतीक्षा-सूची की संख्या में वृद्धि हुई है ।

(ख) 1991-92 एवं 1993 में मार्च के अन्त तक पम्पसेट कनेक्शनों की लम्बित सूची का राज्य-वार ब्यौरा विवरण में दिया गया है (**नीचे देखीए**) ।

(ग) प्रत्येक वर्ष कितने पम्पसेटों को उर्जीकृत किया जाना है । इसका निर्णय योजना आयोग के अनुमोदन से संसाधनों की उपलब्धता को ध्यान में रखते हुए राज्य बिजली बोर्डों द्वारा किया जाता है । पम्पसेट उर्जीकरण कार्यक्रमों को राष्ट्रीय कृषि एवं ग्रामीण विकास बैंक (नाबार्ड) के सहयोग से ग्रामीण